# CONCLUSION

We have presented the privacy-preserving e-KYC approach based on the block chain. Our proposed scheme delivers secure and decentralized authentication and verification of the e-KYC process with the user's consent enforcement feature. In our scheme, the privacy of both customers' identity documents stored in the cloud is guaranteed by the symmetric key and public key encryption while the sensitive transaction data stored in the block chain is encrypted by symmetric key encryption and CP-ABE. Our scheme also allows the KYC data to be updated by the data owner or the customer. In addition, we devised an access policy update algorithm to enable dynamic access authorization. For the evaluation, we performed comparative analysis between our scheme and related works in terms of the computation cost, the communication cost, and performance. The experimental

results showed that our scheme outperforms existing schemes in terms of performance, comprehensive KYC compliance features, and the scalable access control mechanism. For future works, we will test a larger sample of data in the real cloud environment and measure the throughput of the system in accommodating high number of e-KYC registration and verification requests. In addition, we will investigate the technique to enable batch verification of e-KYC transactions stored in the block chain with the searchable encryption feature